

ABSTRACT OF THE DISCLOSURE

A ferroelectric thin film element comprises a substrate and an epitaxial ferroelectric thin film provided on the substrate. The thin film satisfies
5 $z/z_0 > 1.003$ and $0.997 \leq x/x_0 \leq 1.003$, where a crystal face of said thin film parallel to a crystal face of a surface of the substrate is taken as a Z crystal face, a face spacing of the Z crystal face is taken as z , a face spacing of the Z crystal face of a
10 material constituting the thin film in a bulk state is taken as z_0 , a crystal face of the thin film perpendicular to the Z crystal face is taken as an X crystal face, a face spacing of the X crystal face is taken as x and a face spacing of the X crystal face
15 of the material constituting the thin film in a bulk state is taken as x_0 .